

**REMARKS**

In response to the Examiner's Action mailed December 2, 2004, applicants traverse hereby the Examiner's Requirement for Restriction set forth therein and request respectfully reconsideration and withdrawal of the Requirement.

The Examiner requires restriction between the following groups of claims:

Group I - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-phenyl or SO<sub>2</sub>-naphthyl, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group II - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-(5-membered heteroaryl or heterocycl), pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group III - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-(6-membered heteroaryl), pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group IV - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-quinolinyl, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group V - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-benzopyranyl, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group VI - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-b]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-phenyl or SO<sub>2</sub>-naphthyl, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group VII - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 - 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-b]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-(5-membered heteroaryl or heterocycl), pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group VIII - The compounds of Formula I of Claims 1, 2, 6, 8 - 12, 14, 22 and 24- 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-b]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-(6-membered heteroaryl), pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group IX - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-b]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-quinolinyl, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group X - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[2,3-b]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-benzopyranyl, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group XI - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[3,2-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-phenyl or SO<sub>2</sub>-naphthyl, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group XII - The compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, wherein Ar<sup>1</sup> is pyrrolo[3,2-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-(5-membered heteroaryl or heterocycl), pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group XIII - The compounds of Formula I of Claims 1, 2, 6, 8 - 12, 14, 22 and 24- 34, wherein Ar<sup>1</sup> is pyrrolo[3,2-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-(6-membered heteroaryl), pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group XIV - The compounds of Formula I of Claims 1, 2, 6, 8 - 12, 14, 22 and 24- 34, wherein Ar<sup>1</sup> is pyrrolo[3,2-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-quinolinyl, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group XV - The compounds of Formula I of Claims 1, 2, 6, 8 - 12, 14, 22 and 24 - 34, wherein Ar<sup>1</sup> is pyrrolo[3,2-c]pyridinyl and R<sub>2</sub> is SO<sub>2</sub>-benzopyranyl, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents;

Group XVI - The remaining compounds of Formula I of Claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34, pharmaceutical compositions thereof, and Factor Xa inhibiting treatment methods using the compounds, classified in Classes 514, 546 and various subclasses depending on substituents; and

Group XVII - The combination therapy methods and compositions of claims 35 – 41 classified in Class 514 and various subclasses depending on the additional agents.

The basis for the Examiner's Requirement for Restriction is that he considers the claim groups to be distinct because while all groups are directed to pyrrolidinone compounds, the ring alone does not sufficiently define the invention or contribute to the art. The Examiner states that the compounds are not disclosed as capable of being used together and have different modes of operation and function. The Examiner notes that the different combinations of pyrrolidinone with pyrrolopyridine and the R<sub>2</sub> groups define different inventions.

Applicants respectfully disagree that the inventions have different modes of operation, function and different effects. The inventions defined in the claims of Groups I through XVII have a common utility, Factor Xa inhibition. While there may be patentable distinctions among the compounds, the claim Groups identified by the Examiner are not independent.

This is particularly striking with respect to claim Groups I, VI and XI, Claim Groups, II, VII and XII, Claim Groups III, VIII and XIII, etc., in which the claimed compounds vary only by the positioning of the heteroatom around the pyrrolopyridine ring. Rearrangement of heteroatoms within a ring structure does not give rise to an independent invention.

Nor do Claim Groups I – V, VI – X and XI – XV represent independent inventions. Each five claim groups vary only by a single amino substituent on the pyrrolidinone ring. Such a minor substituent variation also does not create independent inventions.

Moreover, the Examiner has not even attempted in his Action to explain why he considers the claims to be directed to independent inventions other than to make an unsupported conclusory statement that the compounds as grouped are independent. Consequently, the Examiner has issued a requirement that is deficient on its face because he has not

explained why the two claim groups are considered to define independent subject matter. Accordingly, the Requirement should be withdrawn.

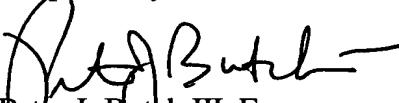
It is submitted further that the Examiner's Requirement should be withdrawn because a proper search of the subject matter of the claim Groups requires that a search be conducted for the subject matter of all groups of claims. This is because the subject matter of the claims is so interrelated. The combination therapy methods and compositions are prepared from the compounds of the other claim groups and use no other Factor Xa inhibitors.

As requested by the Examiner, applicants elect provisionally with traverse to prosecute combination therapy and composition claims 35 -41 of Group XVII. Claims 1 – 34 and 42 are now canceled. Claims 35 and 39 have been rewritten in independent form to incorporate the subject matter of the independent and intervening claims from which they depend, which does not introduce new matter. In doing so, the three pyrrolopyridine structures have been replaced with a structure generic to all three rings. This was disclosed in original claim 21 and also does not introduce new matter.

Applicants request respectfully that, upon indication of allowable subject matter with regard to the elected claims, withdrawn Group I – XVI compound, composition and treatment method claims 1, 2, 6, 8 – 12, 14, 22 and 24 – 34 be rejoined for examination of patentability (M.P.E.P. Section 821.04). A favorable action on the merits is respectfully requested. If there are any additional charges in connection with this response, the Examiner is authorized to charge Applicant's Deposit Account No. 19-5425 therefor.

Respectfully submitted,

*April 4, 2005*

  
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